## 13.03 Deferred Tax Liabilities

Rog Co. prepays a \$50 expense at the start of the year that is for the next 5 years. For book purposes our expense is \$50/5 = \$10/year as we are using accrual accounting. For tax purposes, we deduct all \$50 today as we are using the cash basis. Assume the current tax rate is 20%, and the future rate is 30%.

	Book			Тах			
X1	Expense	10		Expense	50		
	Prepaid expense	40		Cash		50	
	Cash		50				
X2	Expense	10		Expense	0		
	Prepaid		10	Cash		0	

If income in X1 was \$150 before this \$50 expense and \$200 in X2,

X.	1		X	2	
\$15	50		\$20	00	
Book	Tax		Book	Tax	
150	150		200	200	
<u>-10</u>	<u>-50</u>		<u>-10</u>	- <u>0</u>	
140	100	× 20% = \$20	190	200	× 30% = \$60
		current tax liability			

Difference is \$40 which will reverse at \$10 per year, if future tax rate is 30%, \$40 × 30% = \$12 deferred tax liability

Difference is \$10, so the difference starts to reverse out. We then measure the remaining Liability of \$30 (40-10) at the future tax rate of 30%, and that gives us a new Target Liability of \$9.

**Note**: The cumulative difference is analyzed over time to determine the amount needed in the deferred tax liability account at year end.

## The Journal entries would be:

X1	Income tax expense	32	•	(20 current/12 deferred)
	Deferred tax Liability		12	
	Current tax Liability		20	
X2	Income tax expense	57	-	<ul> <li>(60 current/3 deferred)</li> </ul>
	Deferred tax liability	3	•	(to get to target of \$9)
	Current tax Liability		60	

The calculations of current and deferred taxes for 20X1 are:

Year	20X1	20X2	20X3	20X4	20X5
Taxable	100	0	0	0	0
Accounting	140	(10)	(10)	(10)	(10)
Difference	(40)	10	10	10	10
Rate	20%	30%	30%	30%	30%
Current tax	20				
Deferred tax		3	3	3	3 = 12

The current income tax expense on the \$100 of taxable income at the effective 20% rate is \$20, and is recorded as follows (assuming no prepayments):

Presentation on the Income Statement	X1		X2
Provision for income taxes			
Current	(\$20)	Current	(\$60)
Deferred	(\$12)	Deferred	<u>\$3</u>
Total provision for income taxes	(\$32)		(\$57)

Note: The tax rate used is the **enacted** tax rate. That is the rate expected to be in effect when the temporary difference is paid or realized.

The *Effective Tax Rate* is the Average rate at which pretax profits are being taxed. It is calculated by taking the income tax expense divided by its net income before taxes.

## **Changes in Tax Law**

ASC 740 requires any impact on deferred taxes due to changes in tax law (eg, change in tax rates) to be recognized in the reporting period that includes the **enactment date**. If a change is made during an *interim period*, an entity reflects the change in the estimated annual rate in the period of enactment instead of in the period that includes the effective date (a prospective transition approach).